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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/080,862	02/22/2002	Jyrki Ignatius	0365-0530P	9773

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EXAMINER	
JOHNSON, JERRY D	

ART UNIT	PAPER NUMBER
1764	

DATE MAILED: 03/09/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	10/080,862	IGNATIUS ET AL.	
	Examiner	Art Unit	
	Jerry D. Johnson	1764	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *14 December 2004*.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-6 and 8-11* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-6 and 8-11* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☒ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date _____.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____ .
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: _____.

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The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

Claims 1-6 and 8-11 are rejected under 35 U.S.C. 103(a) as being unpatentable over Trotta et al. in view of Scott et al.

Trotta et al., U.S. Patent 6,241,791, teach that with respect to gasoline the content of olefins (mainly light olefins) should be reduced (column 1, lines 21-25) and that the use of high-octane hydrocarbon components deriving from the selective oligomerization of isobutene, has a synergic effect with that of some low-boiling and high-octane components, such as for example, ethanol (column 6, lines 47-52). This specific use can also comprise the formulation of gasolines not containing oxygen but at the same time complying with the strictest environmental specifications (column 6, lines 53-56). Trotta et al. teach gasoline having a RON octane number equal to or higher than 90 and a MON octane number equal to or higher than 80 containing a typical gasoline cut, having a boiling point ranging from 30 to 220°C, one or more compounds deriving from the selective oligomerization of isobutene, which may optionally have been at least partially hydrogenated, in a quantity ranging from 0.5 to 20% by weight, preferably from 5 to 18%, wherein the dimmers of isobutene and possible co-dimers of isobutene with n-butenes are a in a quantity of at least 80% by weight, preferably at least 85%, more preferably at least 90%, and optionally ethanol in a quantity ranging from 0 to 10% by weight, preferably from 0.5 to 6% (column 6, line 57 to column 7, line 6). While Trotta et al. teach gasoline compositions comprising "a typical gasoline cut, having a boiling point ranging from 30 to 220°C" having a reduced content of olefins (mainly light olefins) comprising one or more compounds deriving from the selective oligomerization of isobutene, which may optionally have been at least

partially hydrogenated, in a quantity ranging from 0.5 to 20% by weight, preferably from 5 to 18%, Trotta et al. differ from the instant claims in not disclosing the claimed distillation properties, aromatics content and Reid Vapor Pressure.

Scott et al., Patent Application Publication US 2002/0014035 A1, teach a method for blending unleaded gasoline containing ethanol, and having a Reid Vapor Pressure of 8.0 psi or less, and more preferably 7.0 psi or less [paragraph 0015]. There is less than 0.1 wt. %, more preferably less than 0.05 wt. %, and most preferably less than 0.01 wt. % of ether compounds in the blended gasoline [paragraph 0071]. The gasoline can be blended to achieve any octane rating desired. A regular gasoline with an octane rating of at least 87, a mid-grade gasoline with an octane rating of at least 89 or 90 or a premium gasoline with an octane rating of at least 91 can also be prepared [paragraph 0074]. In Table 4, pages 6-8 of Scott et al., ethanol free fuel compositions having the aromatic content and distillation properties of the instant claims are disclosed.

It would have been obvious to one having ordinary skill in the art at the time the invention was made to formulate a gasoline composition as taught by Trotta et al. comprising a typical gasoline cut and one or more compounds deriving from the selective oligomerization of isobutene, said gasoline having a reduced content of light olefins, said gasoline having an aromatic content, Reid Vapor Pressure and distillation properties of an ethanol free base gasoline as taught by Scott et al.

The following is a quotation of the first paragraph of 35 U.S.C. 112:

> The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

Claims 1-6 and 8-11 are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the written description requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention.

The specification, as originally filed, lacks support for the now claimed limitation of "an ethanol-free gasoline", i.e., the specification as filed, teaches that "the present fuel can also contain various oxygenates, such as alkanols" (specification, page 7, lines 7). Accordingly, the specification teaches that an oxygenate may, but does not have to be, included. There is, however, no support for selectively excluding ethanol while leaving the claims open to the addition of other oxygenates.

Claim 10 is objected to under 37 CFR 1.75(c), as being of improper dependent form for failing to further limit the subject matter of a previous claim. Applicant is required to cancel the claim(s), or amend the claim(s) to place the claim(s) in proper dependent form, or rewrite the claim(s) in independent form.

Applicant's arguments with respect to claims 1-6 and 8-11 have been considered but are moot in view of the new ground(s) of rejection.

Applicants urge that claim 10 does further limit claim 1 in that it defines the boiling point of the heavy branched olefins and as for reconsideration and removal of the claim objection.

Claim 1, from which claim 10 depends, requires a combined content of trimethylpentenes, trimethylhexenes and trimethyl-heptenes greater than 1 vol. %.

Trimethylpentenes, trimethylhexenes and trimethyl-heptenes are all "heavy olefins having a boiling point above 90° C. Accordingly, claim 10 fails to further limit claim 1.

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jerry D. Johnson whose telephone number is (571) 272-1448. The examiner can normally be reached on 6:00-3:30, M-F, alternate Fridays off.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Glen Caldarola can be reached on (571) 272-1444. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Jerry D. Johnson
Primary Examiner
Art Unit 1764

jdj